

TWO NEW SPECIES AND A NEW COMBINATION IN THE GENUS *KALANCHOE*

H. R. TÖLKEN

(Botanical Research Institute, Pretoria)

ABSTRACT

K. neglecta Toelken, *K. rubinea* Toelken and the new combination *K. luciae* Hamet subsp. *montana* (Compt.) Toelken are published.

UITTREKSEL

TWEE NUWE SPESIES EN 'N NUWE KOMBINASIE IN DIE GENUS *KALANCHOE*

K. neglecta Toelken, *K. rubinea* Toelken en die nuwe kombinasie *K. luciae* Hamet subsp. *montana* (Compt.) Toelken word gepubliseer.

Raymont Hamet worked for many years on the taxonomy of the genus *Kalanchoe*. He was, however, unable to complete a revised version of his early monograph published in 1907, and a number of names used by him on determinavit labels were not validly published. The need thus arose to re-evaluate these taxa and to validly publish them in order to avoid confusion.

Kalanchoe luciae Hamet subsp. *luciae*

K. luciae Hamet in Bull. Herb. Boissier ser. 2, 8: 256 (1908); Hamet et Marnier-Lapostolle, Gen. *Kalanchoe* au Jard. Bot. Les Cedres 91, figs 112-114 (1964). Type: Transvaal, Spelonken, *Junod s.n.* (G, holo.).

Plants often up to 1,5 m high and glabrous. *Leaves* obovate to orbicular rarely oblanceolate. *Sepals* 2,5-4-5 mm long, glabrous. *Squamae* usually square to transversely oblong.

— subsp. *montana* (Compt.) Toelken, comb. nov.

K. montana Compt. in Jl S. Afr. Bot. 33: 295 (1967). Type: Swaziland, near Devil's Bridge, *Compton 29 471* (NBG, holo.!).

Plants rarely more than 1 m high and usually hairy. *Leaves* narrowly oblanceolate to rarely obovate. *Sepals* 5-6,5(-7) mm long, with scattered hairs. *Squamae* oblong.

The subsp. *montana* is usually found associated with rock outcrops in sour grassveld while the typical subspecies grows on rocky upper slopes of hills in bushveld.

Kalanchoe neglecta Toelken, sp. nov. a *K. rotundifolia* Haw. thyrsos corymbosus densus et foliis profunde cordatis; a *K. hirta* Harv. lobis angustis corollae et foliis profunde cordatis differt.

Herbae perennes ramis erectis, per florescentia usque ad 1 m altis et 15 mm in diametro, glabrae. *Folia* petiolata, glabra; petioli 20–50(–80) mm longi, leviter sulcati supra; laminae ovatae 35–80(–130) mm longae, profunde cordatae vel peltatae, integrae vel leviter sinuatae, patelliformes vel planae, virides. *Inflorescentia* thyrsus corymbosus floribus multis in dichasiis densis. *Calyx* lobis anguste lanceolatis, (1,5–)2–3 mm longus, glaber, viridis. *Corolla* glabra, tubo paene tereti 6–7,5 mm longo; lobi anguste lanceolati et aceres, 2,5–3,5 mm longi, vitellini vel aurantiaci. *Stamina* verticillis duobus longitudine inaequali, antheris flavis 0,5–0,6 mm longis et quoque appendicula terminali indistincta. *Squamae* lineares 1,6–2,5 × 0,2–0,3 mm, gradatim decrescentes ad apices, vix crassae, pallide flavae. *Carpella* stylis brevibus tenuibus et stigmatibus terminalibus; ovarium ovulis multis quoque c. 0,5 mm longis.

Type: Natal, Sordwana Bay, Vahrmeijer & Tölken 835 (PRE, holo.!).

Perennial herbs with erect branches up to 1 m high and 15 mm in diameter when in flower, glabrous. *Leaves* petiolate, glabrous; petioles 20–50(–80) mm long, slightly grooved above; lamina ovate 35–80(–130) mm long, deeply cordate or peltate, entire or slightly sinuate, flat to patelliform, green. *Inflorescence* a corymbose thyrsus with many flowers arranged in dense dichasia. *Calyx* with lobes narrowly lanceolate, (1,5–)2–3 mm long, glabrous, green. *Corolla* glabrous, with tube almost terete and 6–7,5 mm long; lobes narrowly lanceolate and sharply pointed, 2,5–3,5 mm long, yellow to orange. *Stamens* in two whorls of unequal length, with yellow anthers 0,5–0,6 mm long and each with an indistinct terminal appendage. *Squamae* linear, 1,6–2,5 × 0,2–0,3 mm, gradually tapering towards the apices, scarcely fleshy, pale yellow. *Carpels* with short thin styles and terminal stigmata; ovary with many ovules each c. 0,5 mm long.

Growing in small groups but never common, on sandy soil in north-eastern Natal.

Hamet used the name *K. rotundifolia* var. *peltata* on determinavit labels but this name cannot be used at species level because of *K. peltata* Baill.

Kalanchoe rubinea Toelken, sp. nov. a *K. longiflora* Schltr. ex J. M. Wood ramibus teretibus et foliis plicatis recurvatis rubinescentibus differt.

K. longiflora var. *coccinea* Marnier-Lapostolle ex Jacobsen, Handb. Succ. Pl. 2: 652, fig 866 (1960); Sukk. Lex. 253, t. 105,1 (1970), non rite publicatum.

Herbae perennes ramibus decumbentibus teretibus sed inflorescentiis erectis in flore usque ad 1 m altis. *Folia* quoque plerumque petiolo, glabra; petiolus (8–)15–30(–45) mm longus, paene teres sed sulco non profundo supra; lamina late

elliptica vel ovata, 50–70(–100) mm longa, 40–60(–80) mm lata, cordata in foliis infernis sed plus minusve cuneata in foliis supernis, longitudinaliter plicata et plus minusve recurva, lobis quoque 1–3(4) dentibus obtusis, viridis vel atrorubinea. *Inflorescentia* thyrsus corymbosis dichasiis multis. *Calyx* lobis triangulari-lanceolatis, (1,5–)2–3(–5) mm longus, glaber, flavo-viridis. *Corolla* glabra, tubo 9–14(–15) mm longo et quadrangulati; lobi late ovati vel paene orbiculares et mucronibus terminalibus, 2,5–4 mm longi, minute papilloso, flavi. *Stamina* verticillis duobus longitudine inaequati, antheris flavis 0,7–1 mm longis et quoque appendicula terminali gracili. *Squamae* lineari-lanceolatae, 1,6–4 × 0,8–1,1 mm, apicibus gradatim constrictis, vix succulentae, pallide flavae. *Carpella* stylis papilloso gracilibus et stigmatibus terminalibus prominentibus; ovarium 50–80 ovulis quoque 0,6–0,8 mm longis.

Type: Transvaal, Soutpansberg, *Galpin 14 934* (PRE, holo.!).

Perennials with decumbent branches but erect inflorescences up to 1 m high when in flower, with terete branches. *Leaves* usually petiolate, glabrous; petiole (8–) 15–30(–45) mm long, almost terete but with indistinct groove above; lamina broadly elliptic to ovate, 50–70(–100) mm long, 40–60(–80) mm broad, cordate on lower leaves, cuneate in upper leaves, folded length-wise and more or less recurved, with lobes each with 1–3(–4) obtuse teeth, green to deep ruby red. *Inflorescence* a corymbose thyrsus with many dichasia. *Calyx* with lobes triangular-lanceolate (1,5–)2–3(–5) mm long, glabrous, yellowish-green. *Corolla* glabrous, with tube 9–13(–15) mm long and quadrangular; lobes broadly ovate to almost orbicular and with terminal mucro, 2,5–4 mm long, minutely papillose, yellow. *Stamens* in two whorls of unequal length, with broad yellow anthers 0,7–1 mm long and each with a slender terminal appendage. *Squamae* linear-lanceolate, 1,6–4 × 0,8–1,1 mm, gradually tapering towards the apex, scarcely fleshy, pale yellow. *Carpels* with slender papillose style and prominent terminal stigmas, ovary with 50–80 ovules each 0,6–0,8 mm long.

K. rubinea occurs along the Eastern Transvaal escarpment from eastern Swaziland to the Soutpansberg.

This species, which is widely used in horticulture, was always confused with *K. longiflora*, an endemic species of central Natal.